National Ecological Observatory Network



The National Ecological Observatory Network will usher in a new era of observational science as the **first research observatory** designed to advance fundamental theories of life.

Current Construction Status

- Civil Construction
 - 48 of 82 locations
- Sensor Deployment
 - 22 locations in 8 domains
- Biological Sampling
 - 29 of 82 locations
- Domain Field Offices
 - 16 of 20 operating with
 Domain Managers hired

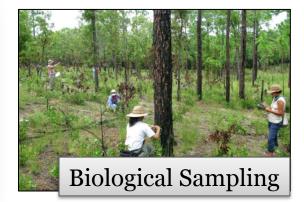
Three Airborne Observatory Platforms

- ✓ Pathfinder flight in July
- ✓ 6 domains have been remotely surveyed
- ✓ 2 research campaigns completed
- ✓ Payload Installation Facility occupied by Flight Operations

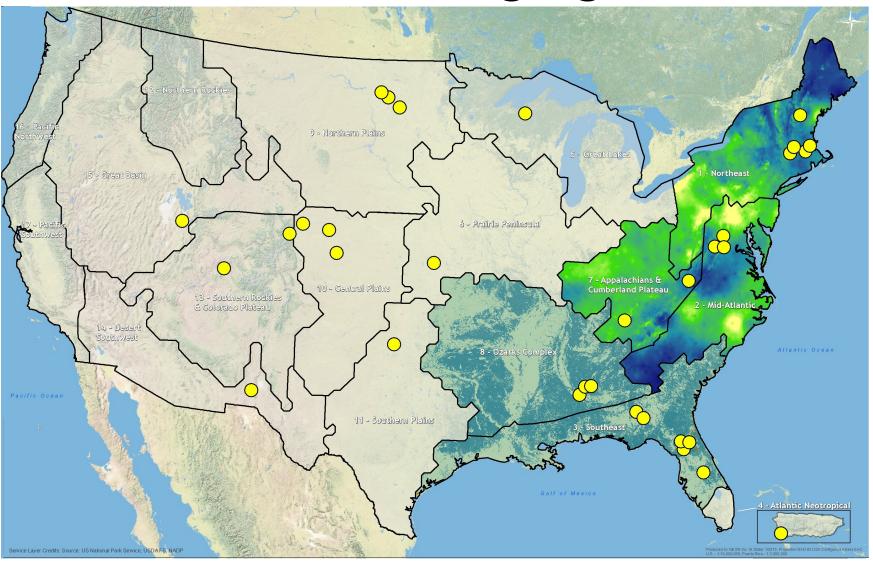
Data Products on NEON Portal 34 sites for terrestrial and aquatic 5 Domains for AOP







Schedule Highlights



NEON's Initial Observatory Research Capability includes biological and sensor data across Domain gradients of nitrogen and landuse change and continental scale nitrogen and climate gradients along the east coast of the US. This capability was largely available in July.

Initial Operations Capability

- Connection with Nitrogen deposition and forest management data
- Infrastructure
- Qualified processes of the Observatory
- Organismal sampling, laboratory analysis and collections
- AOP selected flight campaigns
- Mobile Deployment Platform prototype complete
- Meteorological, biological and remote sensing data available on the portal
- Educational programs
- Calibration and validation
- Domain support facilities (4)
- Web Portal

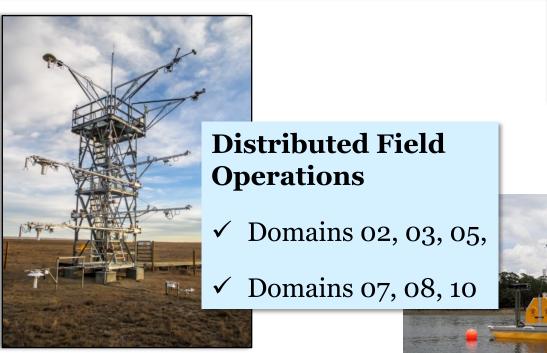


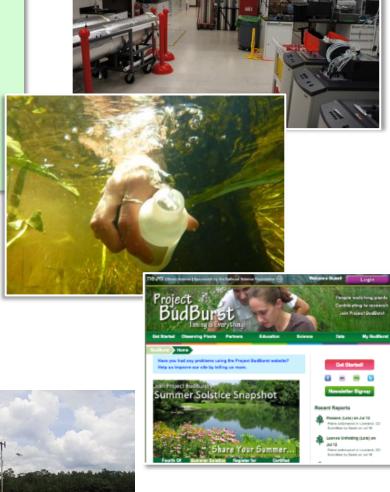


Current Operations Status

Central Operations at NEON HQ in Boulder

- Calibration and Validation Lab
- ✓ Collections and Laboratory Analyses
- ✓ Project BudBurst/Citizen Science Academy





NEON Data and Science



http://data.neoninc.org/home



WORK WITH DATA



NEON WORK WITH DATA

DATA TUTORIALS

ABOUT

DATA WORKSHOPS

R & PYTHON CHEATSHEETS

NEON WEBSITE

http://neondataskills.org

27 NEON EAGERs and Workshops to enable creative, collaborative use of ecological data

Probalistic forecasting of biodiversity response to intensifying drought by combining NEON, national climate species, and trait data bases. Prototyping assessment of ecoclimate teleconnections affecting NEON domains.

Genomic plasticity in response to climate change.

Scaling up terrestrial plant phenology from individuals to continental scale.

NEON Scope Management

Essential NEON requirements during review

- Scope Management Plan and Evaluation
- Science Criteria and Requirements Driven
- Must maintain transformational capabilities

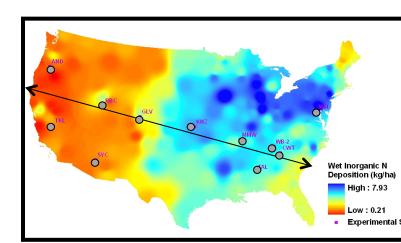
Cost Adjustments & Elements De-descoped

- Management and Transition Efficiencies (30%)
- Technology (Minirhizotrons, Biogenic Gases)
- Relocatables (Invasive species and Urban)
- STREON
- High Level Data Products

http://www.neoninc.org/updates-events/update/scopechange-directives-designed-ensure-overall-success-neonconstruction

Committee:

- Community experts
- NEON, Inc. Project, STEAC, Board
- NSF



NEON, Inc. Management

- Gene Kelly Interim Chief Executive Officer
- Javier Marti Project Manager
- Kirsten Ruiz Acting Observatory Director
- Charlene Laus Chief Financial Officer



Gene has a deep level of experience and reputation as a well-respected leader in the fields of soil science, ecosystem ecology and environmental sustainability. He served as Head of the Department of Soil and Crop Sciences. Concurrently, he has been Associate Director for Research and Development with CSU's School of Global Environmental Sustainability since 2008.